

WHAT IS CLAIMED IS:

1. An apparatus for recording and reproducing a broadcast program, comprising:

a receiver configured to receive program content data broadcasted, the program contents data including viewer response request information;

a memory configured to record the program content data received by said receiver;

a decoder configured to decode the program content data in case of reproducing the program content data stored in said memory, and to extract the response request information from the decoded program content data; and

a sending unit configured to send an item to be counted in response to the viewer's response to the response request information.

2. The apparatus according to claim 1,

wherein the program content data includes commercial content data, and the commercial content data includes commercial identify information as the response request information.

3. The apparatus according to claim 2,

wherein the commercial identify information

includes a commercial identifier, a server address of a commercial audience response control server, an available day as an effective term, a company name as a commercial sponsor, and a commercial name as a title.

4. The apparatus according to claim 3, wherein the program content data are previously encoded as a bit stream of each picture by predetermined coding order in case of broadcastly distributing, and

wherein the commercial identify information is divided into a plurality of elements as response user data, and each element is sequentially inserted on arbitrary pictures of encoded commercial contents data.

5. The apparatus according to claim 4, wherein said decoder sequentially extracts each element from the arbitrary picture of decoded commercial content data, and regenerates the commercial identify information by combining the plurality of elements.

6. The apparatus according to claim 5, further comprising a program response

information memory configured to store the commercial identify information with a non-response flag if the available day in the commercial identify information is effective and the same commercial identify information is not already stored.

7. The apparatus according to claim 6, further comprising a presentation unit configured to inform the viewer of the response request information as the commercial identify information included in the commercial contents data while the commercial contents data is reproducing.

8. The apparatus according to claim 7, wherein said presentation unit displays a list of the commercial identify information corresponding to the non-response flag, and

further comprising a response operation unit configured for the viewer to select the commercial identify information to be responded to from the list.

9. The apparatus according to claim 8, wherein said sending unit creates commercial audience response information including the commercial identifier of the commercial identify

information selected by said response operation unit and an identifier of said apparatus for reproducing the commercial contents data.

10. The apparatus according to claim 9,
wherein said sending unit sends the commercial audience response information to the commercial audience response control server corresponding to the server address in the commercial identify information selected by said response operation unit.

11. The apparatus according to claim 9,
wherein the commercial audience response information additionally includes a user identifier of the viewer.

12. A method for recording and reproducing a broadcast program, comprising:
receiving program contents data broadcasted,
the program content data including viewer response request information;
recording the program content data received at the receiving step in a memory;
decoding the program content data in case of reproducing the program content data recorded in said memory;

extracting the response request information from the decoded program content data; and

sending an item to be counted in response to the viewer's response to the response request information.

13. The method according to claim 12, wherein the program content data includes commercial content data, and the commercial content data includes commercial identify information as the response request information.

14. The method according to claim 13, wherein the commercial identify information includes a commercial identifier, a server address of a commercial audience response control server, an available day as an effective term, a company name as a commercial sponsor, and a commercial name as a title.

15. The method according to claim 14, wherein the program content data are previously encoded as a bit stream of each picture by predetermined coding order in case of broadcastly distributing, and

wherein the commercial identify information is

divided into a plurality of elements as response user data, and each element is sequentially inserted on arbitrary pictures of encoded commercial contents data.

16. The method according to claim 15,
at the decoding step, further comprising:
sequentially extracting each element from the
arbitrary picture of decoded commercial contents
data; and
regenerating the commercial identify
information by combining the plurality of elements.

17. The method according to claim 16,
further comprising:
storing the commercial identify information
with a non-response flag if the available day in the
commercial identify information is effective and the
same commercial identify information is not already
stored.

18. The method according to claim 17,
further comprising:
informing the viewer of the response request
information as the commercial identify information
included in the commercial contents data while the

commercial contents data is reproducing.

19. The method according to claim 18,

further comprising:

displaying a list of the commercial identify information corresponding to the non-response flag, and

selecting the commercial identify information to be responded to from the list in response to the viewer's operation.

20. The method according to claim 19,

at the sending step, further comprising:

creating commercial audience response information including the commercial identifier of the selected commercial identify information and an identifier of an apparatus for reproducing the commercial content data.

21. The method according to claim 20,

at the sending step, further comprising:

sending the commercial audience response information to the commercial audience response control server corresponding to the server address in the selected commercial identify information.

22. The method according to claim 20,
wherein the commercial audience response
information additionally includes a user identifier
of the viewer.

23. A computer program product for use with a
computer, comprising:

a computer usable medium having computer
readable program code embodied in said medium for
causing said computer to record and reproduce a
broadcast program, said computer readable program
code having:

computer readable program code to receive
program content data broadcasted, the program
contents data including viewer response request
information;

computer readable program code to record the
program content data in a memory;

computer readable program code to decode the
program content data in case of reproducing the
program content data recorded in said memory;

computer readable program code to extract the
response request information from decoded program
content data; and

computer readable program code to send an item
to be counted in response to the viewer's response

to the response request information.